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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/732,841	12/10/2003	John E. Mobley	02-12	6693

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DAYCO PRODUCTS, LLC  
1 PRESTIGE PLACE  
MIAMISBURG, OH 45342

EXAMINER

NICHOLSON, ERIC K

ART UNIT	PAPER NUMBER
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3679

DATE MAILED: 09/29/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

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**Office Action Summary**

Application No.

10/732,841

Applicant(s)

MOBLEY ET AL.

Examiner

Eric K Nicholson

Art Unit

3679

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 02 July 2004.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1,3-12 and 14-22 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1,3-12 and 14-22 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_

**DETAILED ACTION**

**Claim Rejections – 35 USC § 102**

The following is a quotation of the appropriate paragraphs of 35 U.S.C. § 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1,3-5 and 12,14-16 are rejected under 35 U.S.C. § 102(b) as being anticipated by U.S. patent 6,199,916 to Klinger et al.. The Klinger et al. connector, which as noted in column 1, lines 15,20 and throughout the “Background of the Invention” relates to fuel and vapor tubes assemblies teaches the present invention with a tube having an outer plastic layer 124, an inner plastic layer 126 and a metallic barrier layer 128 (col. 4, lines 35-40, col. 5, lines 20-25 and col. 7, lines 14-15). The tube is forced into contact with a plastic component along the outer and inner layers of the tube and welded via spin welding (col. 7,

lines 20-25) to form a gas impermeable joint (col. 3, lines 5-10). The plastic component having tapered or funnel portions 82,86,88 (see fig. 5).

As to claims 3 and 14, see fig. 5 which clearly illustrates the recess in the component 48 wherein the recess is defined by surfaces 82,84,88. As to claims 4 and 15, see the cylindrical protrusion 78 with the plastic surface formed on the outer surface 88 of the protrusion. As to claims 5 and 16, see the cylindrical protrusion 76 with the plastic surface formed on the inner surface 82 of the protrusion.

### **Claim Rejections – 35 USC § 103**

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to

which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 6-9, 11, 17-20 and 22 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. patent 6,199,916 to Klinger et al. in view of U.S. patent 5,524,673 to Noone et al.. As noted above the Klinger et al. coupling discloses the claimed invention however the particular dimension of the tube layers are specified. Noone et al. discloses that it is known in the art to provide a similar type composite layered tube with the layer dimensions as described by claims 6-9 and 17-20. See column 3, lines 64-65 which indicates the total wall thickness as between 0.5mm and 2 mm; see column 5, lines 5-6 which indicates the thickness of the outer layer as being between 50-60 percent of the total wall thickness and see column 6, lines 60-63 which indicates the inner wall thickness is 10-25 percent of the outer layer, all dimensions thus fulfilling the requirements of the claims. Further, as to claims 11 and 22 the tube of Noone et al. discloses to include a reinforcement layer 18 exteriorly of the outer plastic layer. It would have been obvious to one having ordinary skill in the art at the time the invention was made to substitute the composite layered tube 46 of Klinger et al. with the composite layered tube taught by Noone et al. as both are directed to the same field of

endeavor of fuel systems for automobiles and further, in order to provide a more secure coupling for the inserted tube due to increased capability of prolonged exposure to hydrocarbons. See column 3, lines 10-30.

Claims 10 and 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. patent 6,199,916 to Klinger et al. in view of U.S. patent 6,074,717 to Little.

As noted above the Klinger et al. coupling discloses the claimed invention however the particular material make-up of the tube 46. Little discloses in claim 1 that it is known in the art to provide a similar type composite layered tube with an inner plastic layer is formed by a first tube, a metallic barrier is formed by an aluminum foil bonded exteriorly about the first tube, and the outer plastic layer is formed by a second tube bonded exteriorly about the aluminum foil. The first tube and the second tube each comprising about 20 percent by weight of EPDM rubber and from about 2 to 9 percent by weight of polybutadiene-maleic anhydride adduct resin. It would have been obvious to one having ordinary skill in the art at the time the invention was made to substitute the composite layered tube 46 of Klinger et al. with the composite layered tube taught by Noone et al. as both are directed to the same field of endeavor of fuel systems for automobiles and, since it has been held to be within the general skill of a worker in the art to select a known material on

the basis of its suitability for the intended use as a matter of obvious design choice.

*In re Leshin*, 125 USPQ 416.

### **Conclusion**

Applicant's arguments filed July 2, 2004 have been fully considered but they are not persuasive. Applicant argues that the Klinger '916 patent does not teach or suggest either a method of forming a joint between the tube claimed in claim 1 of the present invention and a fuel fill system funnel or a fuel fill system including such a tube and funnel joined by a spin welded joint. The examiner disagrees, first in as much as applicants claims recite a fuel fill system amounts merely to a matter of intended use and it has been held that a recitation with respect to the manner in which a claimed apparatus is intended to be employed does not differentiate the claimed apparatus from a prior art apparatus satisfying the claimed structural limitations. Secondly, the Klinger patent is to be used in a fuel fill system as is clearly set forth in column 1, lines 15-20 which indicate its relation to fuel and vapor tubes and also as clearly noted in the "Background of the Invention" the Klinger device is undoubtedly employed in fuel fill and vapor recovery systems.

Applicant further argues that it would not be obvious to spin weld a tube to a fuel fill system funnel because fuel fill systems are typically asymmetrical, which

is generally not favored for spin welding. This argument is moot for two reasons, first the Klinger coupling is made via spin welding and does include a funnel portion such as clearly shown in fig. 5 and surfaces 82,86,88. and second applicant's statement of "*typically asymmetrical*" and "*generally not favored for spin welding*" readily admits the antithesis of the argument, that spin welding a tube to a fuel system funnel is , though not "typical" or "favored" but none the less capable.

**THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.



The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

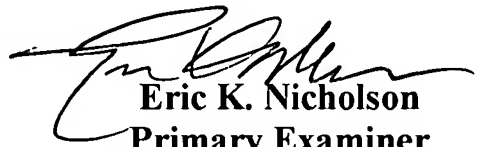
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Eric Nicholson whose telephone number is (703) 308-0829. The examiner can normally be reached on Tuesdays thru Fridays from 7:30 to 6:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Daniel P. Stodola, can be reached on (703) 308-2686. The fax phone number for Technology Center 3600 is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Technology Center receptionist whose telephone number is (703) 308-1113.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll free).

ekn  
9/22/04



**Eric K. Nicholson**  
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